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EXAMINER	
AHMED, SALMAN	

ART UNIT	PAPER NUMBER
2616	

DATE MAILED: 04/20/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

/

Office Action Summary	Application No.	Applicant(s)	
	10/015,926	KRISHNAMURTHI ET AL.	
	Examiner	Art Unit	
	Salman Ahmed	2616	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *3/20/06(Amendment)*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1,2 and 5-68* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1,2,5-13,15-20,22,23,25-46,50-52 and 54-68* is/are rejected.

7)☒ Claim(s) *14, 21, 24, 47- 49, 53* is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *10 December 2001* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Claims 1, 2, 5-68 are pending.

Claims 3 and 4 are cancelled by applicant.

Claims 1-2, 5-13, 15-20, 22, 23, 25-46, 50-52, 54-68 are rejected.

Claims 14, 21, 24, 47- 49 and 53 are objected.

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

2. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

3. Claims 1, 2, 6-8, 10, 30, 32-38, 59 and 60 rejected under 35 U.S.C. 103(a) as being unpatentable over Numminen et al. (US PAT 6687499), hereinafter referred to as Numminen.

In regards to claims 1, 2, 6-8, 10, 30, 32-38, 59 and 60 Numminen teaches a memory (column 7 line 27, memory media) communicatively coupled to a digital signal processing device (DSPD) (column 7 line 26, a microprocessor) capable of interpreting digital information to: receive a first message having included therein test settings for one or more channels (column 7 lines 18-20, test mode means that the mobile station to be tested is instructed to maintain a connection on a certain transmission channel) comprising traffic channels, auxiliary channels, (column 11 lines 4-6, data, traffic and control channels) or a combination thereof (column 7 lines 46-47, at first the test equipment sends a comparison and statistical operation start command associated with the data channel); configure the one or more channels based on the test settings in the first message (column 7 lines 59-61, The mobile station closes, i.e. activates, the test loop); receive test packets via a forward traffic channel (column 8 lines 4-7, once the G loop has been activated the test equipment can start sending test data); transmit loop back packets via a reverse traffic channel (column 8 lines 39-40, the test equipment receives the uplink frames sent by the mobile station), and transmit signaling data via traffic or one or more auxiliary channels (column 11 lines 4-6, applicability of the invention to all mobile communication systems in which a mobile station can operate on data, traffic and control channels.

In regards to claims 1, 6, 30 and 32 Numminen does not explicitly teach wireless data communication system is a code division multiple access (CDMA) system supporting cdma200 high rate packet data air interface (HM) standard.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to apply the above method/system to any communication related standards including CDMA2000 high rate packet data air interface (HM) standard. The motivation is that, adapting to standards can reap short- and long-term cost-savings and competitive benefits than those that do not adapt to standards. Companies are motivated to participate in standardization because they gain an edge over non-participating companies in terms of portability. Standardization can lead to lower transaction costs in the economy as a whole, as well as to savings for individual businesses. The transaction costs drop considerably as a result of standards, since they make information available and they are accessible to all interested parties. Companies also can increase confidence in the quality and reliability of suppliers who use standards.

In regards to claims 30 and 59, Numminen teaches updating a plurality of variables based on the parameter values included in the second data transmission (column 10 lines 46-49, the quality control station of a cellular radio network may collect statistical data sent by mobile stations and received by base stations from different parts of the cellular radio network).

4. Claims 5 and 9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Numminen et al. (US PAT 6687499), hereinafter referred to as Numminen in view of Funk et al. (US PAT 6766164), hereinafter referred to as Funk.

In regards to claim 5, Numminen teaches a memory (column 7 line 27, memory media) communicatively coupled to a digital signal processing device (DSPD) (column 7 line 26, a microprocessor) capable of interpreting digital information to: receive a first message having included therein test settings for one or more channels (column 7 lines 18-20, test mode means that the mobile station to be tested is instructed to maintain a connection on a certain transmission channel) comprising traffic channels, auxiliary channels, (column 11 lines 4-6, data, traffic and control channels) or a combination thereof (column 7 lines 46-47, at first the test equipment sends a comparison and statistical operation start command associated with the data channel); configure the one or more channels based on the test settings in the first message (column 7 lines 59-61, The mobile station closes, i.e. activates, the test loop); receive test packets via a forward traffic channel (column 8 lines 4-7, once the G loop has been activated the test equipment can start sending test data); transmit a plurality of loop back packets via a reverse traffic channel (column 8 lines 39-40, the test equipment receives the uplink frames sent by the mobile station), and transmit a plurality of loop back packets via a reverse traffic channel and transmitting signaling data via traffic or one or more auxiliary channels (column 11 lines 4-6, applicability of the invention to all mobile communication systems in which a mobile station can operate on data, traffic and control channels).

In regards to claims 5 and 9, Numminen does not explicitly teach one loop back packet is formed for each particular time interval.

In regards to claims 5 and 9, Funk in the same field of endeavor teaches (Column 3 lines 61-67) test packets being formed for particular time interval.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Numminen's method by incorporating one loop back packet being formed for each particular time interval as taught by Funk. The motivation is that generating and sending test packets at regular interval helps to diagnose a communication system very efficiently and effectively.

5. Claims 24 and 28 are rejected under 35 U.S.C. 103(a) as being unpatentable over Numminen et al. (US PAT 6687499), hereinafter referred to as Numminen in view of Buchholz et al. (US PAT 5555266), hereinafter referred to as Buchholz.

In regards to claim 28, Numminen teaches a memory (column 7 line 27, memory media) communicatively coupled to a digital signal processing device (DSPD) (column 7 line 26, a microprocessor) capable of interpreting digital information to: receive a first data transmission via a first channel wherein first data transmission comprises a plurality of packets (column 7 lines 18-20, test mode means that the mobile station to be tested is instructed to maintain a connection on a certain transmission channel); identifying parameter values descriptive of the first data transmission (column 7 lines 46-47, at first the test equipment sends a comparison and statistical operation start command associated with the data channel); form a second data transmission with

the identical parameter values (column 7 lines 59-61, The mobile station closes, i.e. activates, the test loop); transmit the second data transmission via a second channel (column 8 lines 39-40, the test equipment receives the uplink frames sent by the mobile station).

In regards to claims 24 and 28 Numminen does not explicitly teach each packet on the second data transmission includes a parameter value indicative of omission of one or more packets received on the first data transmission.

In regards to claims 24 and 28 Buchholz in the same field of endeavor teaches in response to the receipt of a data packet (310) from a remote unit (112), the communications controller (110) identifies missing data within the data packet transmission, determines whether communication resources are available to support retransmission of the missing data, and if so, transmits a response to the requesting remote unit identifying the missing data.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Numminen's system by incorporating the method of notifying sender about missing data as taught by Buchholz. The motivation is that such method will accurately notify the sender about any problems in the communication link, which results in loss of packets; thus making the network more reliable.

6. Claims 29, 31, 39, 45, 50-52, 54-58, 61-63, 65, 67 and 68 are rejected under 35 U.S.C. 103(a) as being unpatentable over Numminen, in view of Kobayasi et al. (US PAT 6333932), hereinafter referred to as Kobayasi, in view of Ikeda (US PAT 5636212).

In regards to claims 29, 31, 39, 45, 57, 63, 67 and 68 Numminen teaches a method for testing one or more channels in a wireless data communication system, comprising: receiving a plurality of test packets via a forward traffic channel as described in the rejections of claims 1, 5, 6 and 28 above.

In regards to claims 29, 31, 39, 45, 57, 63, 67 and 68 Numminen does not explicitly teach a method for testing one or more channels in a CDMA2000 high rate packet data air interface (HM) standard based wireless data communication system.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to apply the above method/system to any communication related standards including CDMA2000 high rate packet data air interface (HM) standard. The motivation is that, adapting to standards can reap short- and long-term cost-savings and competitive benefits than those that do not adapt to standards. Companies are motivated to participate in standardization because they gain an edge over non-participating companies in terms of portability. Standardization can lead to lower transaction costs in the economy as a whole, as well as to savings for individual businesses. The transaction costs drop considerably as a result of standards, since they make information available and they are accessible to all interested parties. Companies

also can increase confidence in the quality and reliability of suppliers who use standards.

In regards to claims 29, 31, 39, 45, 57, 63, 67 and 68 Numminen teaches a method for testing one or more channels in a CDMA2000 high rate packet data air interface (HM) standard based wireless data communication system, comprising: receiving a plurality of test packets via a forward traffic channel as described in the rejections of claims 1, 5, 6 and 28 above.

In regards to claim 29, 31, 39, 57, 63, 67 and 68 Numminen does not explicitly teach identifying a transmission source and a sequence number of each received test packet; forming a plurality of loop back packets for the plurality of received test packets, wherein each loop back packet covers zero or more test packets and includes the transmission source and the sequence number of each covered test packet; and transmitting the loop back packets. In regards to claim 45, Numminen does not explicitly teach selecting rates for the test packets based on a rate selection scheme, and transmitting the test packets at the selected rates on the traffic channel. In regards to claims 50-52, 54 and 55 Numminen does not explicitly teach of having protocol type, packet type, number of records field, time interval, source address, sequence number in the test packet. In regards to claim 58, 62 and 65 Numminen does not explicitly teach a queue for the test packets.

In regards to claim 29, 31, 39, 57, 63, 67 and 68 Kobayasi in the same field of endeavor teaches, (column 2 lines 55-67) a test being started by issuing a test connectionless packet transmission request message (test start request) from the OS

center 1 to SW station 3. The request message contains an identification information ID indicating terminal SW station 6. SW station 3 generates a test packet with the identification address of terminal SW station 6 set as its destination address DA and the identification address of its home station (SW station 3) set as its source address SA. The test packet is output to terminal SW station 6. In SW stations 4 and 5, test packets are processed as normal packets and transferred to terminal SW station 6. On receipt of the test packet, terminal SW station 6 outputs the packet with its DA and SA inverted. That is, the packet is returned from terminal SW station 6 to SW station 3, and it is reported to the OS center 1 upon re-arrival of the packet at the source SW station 3. Kobayasi further teaches the L2-PDU shown in FIG. 783 is an example of a BOM cell. The 2 bytes preceded by the header field stores a segment type ST, sequence number SN, and message identifier MID (or a multiplex identifier). The sequence number SN is a serial number assigned to a transferred cell for convenience in detecting the cell if it is lost or mistakenly inserted. In regards to claim 45 Kobayasi teaches (column 97 lines 45-46) Loopback of a test cell is done in a 156 Mbps cell highway. In regards to claims 50, 51, 54 and 55 Kobayasi discloses protocol type, packet type, number of records field, time interval, source address, sequence number in the packets shown in FIGS. 582 through 628. In regards to claim 52 Kobayasi teaches (column 3 lines 5-10) that since the source SW station 3 and the terminal SW station 6 mark the time stamp onto the payload field of the packet, the OS center 1 is informed of the transmission time of packets according to the information. In regards to claim 58, 62 and 65 Kobayasi teaches buffers (fig 132) for data packets.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Numminen's teaching by incorporating the loopback test scheme as taught by Kobayasi. The motivation is that (as suggested by Kobayasi column 317 lines 29-34) the present invention realizes an efficient test within a short time by performing a test cell loopback check, which has been made in a test device, through a test program in the switch. Additionally, transmitting cell data from a test device requires no testing units because the loopback jig can replace the testing units. Further motivation (as suggested by Numminen, column 11 lines 5-8) is that the invention can also be modified in many ways without departing from the scope of the invention defined by the claims.

In regards to claim 57, Numminen in view of Kobayasi, teaches a loopback scheme for CDMA2000 high rate packet data air interface (HM) standard based system as described in the rejections of claims 29, 31, 39, 45, 63, 67 and 68 above.

In regards to claim 57 Numminen in view of Kobayasi does not explicitly teach message having maximum and minimum rate for rate selection.

In regards to claim 57 Ikeda in the same field of endeavor teaches (column 8 lines 38-39) reservation request being issued with a maximum band-width and a minimum band-width.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Numminen in view of Kobayasi's system/method by incorporating the concept of sending maximum band-width and a minimum band-width via message as taught by Ikeda. The motivation is that (as suggested by Ikeda, column

2 lines 5-10) to provide a flexible method of reserving a band-width for a burst capable of flexibly reserving a band-width according to a maximum band-width and a minimum band-width requested for reservation

In regards to claim 31, Numminen teaches updating a plurality of variables based on the transmission source and sequence number of each packets included in the second data transmission (column 10 lines 46-49, the quality control station of a cellular radio network may collect statistical data sent by mobile stations and received by base stations from different parts of the cellular radio network).

In regards to claims 39 and 56 Numminen teaches a memory (column 7 line 27, memory media) communicatively coupled to a digital signal-processing device (DSPD) (column 7 line 26, a microprocessor).

In regards to claims 61 and 67 Numminen teaches a receive data processor (figure 3 element 304), a transmit data processor (figure 3 element 310) and a controller (figure 3 element 307).

7. Claim 46 is rejected under 35 U.S.C. 103(a) as being unpatentable over Numminen, in view of Kobayasi et al. (US PAT 6333932), hereinafter referred to as Kobayasi, in view of Ikeda (US PAT 5636212).

In regards to claims 46 Numminen in view of Kobayasi, teaches a loopback scheme for CDMA2000 high rate packet data air interface (HM) standard based system as described in the rejections of claim 45 above.

In regards to claim 46 Numminen in view of Kobayasi does not explicitly teach message having maximum and minimum rate for rate selection.

In regards to claim 46, Ikeda in the same field of endeavor teaches (column 8 lines 38-39) reservation request being issued with a maximum band-width and a minimum band-width.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Numminen in view of Kobayasi's system/method by incorporating the concept of sending maximum band-width and a minimum band-width via message as taught by Ikeda. The motivation is that (as suggested by Ikeda, column 2 lines 5-10) to provide a flexible method of reserving a band-width for a burst capable of flexibly reserving a band-width according to a maximum band-width and a minimum band-width requested for reservation

8. Claims 11-13, 15-20, 22, 23, 25-27 are rejected under 35 U.S.C. 103(a) as being unpatentable over Numminen, in view of Kobayasi et al. (US PAT 6333932), hereinafter referred to as Kobayasi, in view of Ikeda (US PAT 5636212).

In regards to claims 11, 12, 13, 15, 16, 17, 18, 19, 20, 22, 23, 25, 26 and 27 Numminen teaches a method for testing one or more channels in a CDMA2000 high rate packet data air interface (HM) standard based wireless data communication system, comprising: receiving a plurality of test packets via a forward traffic channel as described in the rejections of claims 1 and 6 above.

In regards to claims 11, 12, 13, 15, 16, 17, 18, 19, 20, 22, 23, 25, 26 and 27 Numminen does not explicitly teach of having protocol type, packet type, number of records field, time interval, source address, sequence number in the test packet.

In regards to claims 11, 12, 15, 16, 17, 18, 19, 22, 23, 25, 26 and 27 Kobayasi in the same field of endeavor teaches protocol type, packet type, number of records field, time interval, source address, sequence number in the packets shown in FIGS. 582 through 628. In regards to claims 13 and 20 Kobayasi teaches (column 3 lines 5-10) that since the source SW station 3 and the terminal SW station 6 mark the time stamp onto the payload field of the packet, the OS center 1 is informed of the transmission time of packets according to the information.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Numminen's system/method by incorporating the loopback test scheme as taught by Kobayasi. The motivation is that (as suggested by Kobayasi column 317 lines 29-34) the present invention realizes an efficient test within a short time by performing a test cell loopback check, which has been made in a test device, through a test program in the switch. Additionally, transmitting cell data from a test device requires no testing units because the loopback jig can replace the testing units. Further motivation (as suggested by Numminen, column 11 lines 5-8) is that the invention can also be modified in many ways without departing from the scope of the invention defined by the claims.

9. Claims 40-43, 44, 64 and 66 are rejected under 35 U.S.C. 103(a) as being unpatentable over Numminen, in view of Oommen et al. (US PAT 6799203).

In regards to claims 40-43, 44, 64 and 66 Numminen teaches a method for testing one or more channels in a wireless data communication system, comprising: receiving a plurality of test packets via a forward traffic channel as described in the rejections of claims 1, 5, 6 and 28 above.

In regards to claims 40-43, 44, 64 and 66 Numminen does not explicitly teach a method for testing one or more channels in a CDMA2000 high rate packet data air interface (HM) standard based wireless data communication system.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to apply the above method/system to any communication related standards including CDMA2000 high rate packet data air interface (HM) standard. The motivation is that, adapting to standards can reap short- and long-term cost-savings and competitive benefits than those that do not adapt to standards. Companies are motivated to participate in standardization because they gain an edge over non-participating companies in terms of portability. Standardization can lead to lower transaction costs in the economy as a whole, as well as to savings for individual businesses. The transaction costs drop considerably as a result of standards, since they make information available and they are accessible to all interested parties. Companies also can increase confidence in the quality and reliability of suppliers who use standards.

In regards to claims 40, 41, 42, 43 and 66 Numminen teaches in a CDMA2000 high rate packet data air interface (HM) standard based system a method of collecting data for a first parameter while in a first operating state (column 7 lines 46-59, at first the test equipment sends a comparison and statistical operation start command associated with the data channel, which command can be called CLOSE_Multi-slot_loop_CMD. The close command may include an identifier on the basis of which the mobile station identifies the G loop. The mobile station acknowledges the message using an acknowledge message which can be called CLOSE_Multi-slot_loop_ACK. The mobile station closes, i.e. activates, the test loop in a certain time after it has sent the acknowledge. . Numminen teaches collecting a second statistic for a second parameter while in a second operating state (column 8 lines 4-6, once the G loop has been activated the test equipment can start sending test data, i.e. periods of a pseudorandom bit sequence packed in downlink frames). Numminen teaches receiving a first message requesting the first or second statistic, and sending a second message with the requested first or second statistic (column 8 lines 29-39, while the G loop is active the mobile station compares the received bit sequence portions to the locally produced portions and measures e.g. the bit error ratio or frame erasure ratio and compiles statistics of the measurement results in a desired manner. Complete statistics or information elements representing the reception error status in general are sent uplink to the test equipment).

In regards to claim 40, 41, 42 and 43 Numminen does not explicitly teach, collecting statistics during each of the transactions.

In regards to claim 40, 41, 42 and 43 Oommen teaches (column 2 lines 46-49) OTAMD involves requesting statistics and performing diagnostic tests in the MS using a command issued from the network for testing purpose.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Numminen's teaching by incorporating the statistic gathering during transactions as taught by Oommen. The motivation is that (as taught by Oommen, column 1 lines 14-15) a fast and efficient method for activating and managing a MS over the air would be beneficial both for the user and the wireless service provider.

In regards to claim 66 Numminen in view of Oommen teaches loopback test scheme as described above.

In regards to claim 66 Numminen in view of Oommen does not explicitly teach test packets having transmission source and a sequence number.

In regards to claim 66 Kobayasi in the same field of endeavor teaches, (column 2 lines 55-67) a test being started by issuing a test connectionless packet transmission request message (test start request) from the OS center 1 to SW station 3. The request message contains an identification information ID indicating terminal SW station 6. SW station 3 generates a test packet with the identification address of terminal SW station 6 set as its destination address DA and the identification address of its home station (SW station 3) set as its source address SA. The test packet is output to terminal SW station 6. In SW stations 4 and 5, test packets are processed as normal packets and transferred to terminal SW station 6. On receipt of the test packet, terminal SW station

6 outputs the packet with its DA and SA inverted. That is, the packet is returned from terminal SW station 6 to SW station 3, and it is reported to the OS center 1 upon re-arrival of the packet at the source SW station 3. Kobayasi further teaches the L2-PDU shown in FIG. 783 is an example of a BOM cell. The 2 bytes preceded by the header field stores a segment type ST, sequence number SN, and message identifier MID (or a multiplex identifier). The sequence number SN is a serial number assigned to a transferred cell for convenience in detecting the cell if it is lost or mistakenly inserted.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Numminen in view of Oommen's system/method by incorporating the loopback test scheme as taught by Kobayasi. The motivation is that (as suggested by Kobayasi column 317 lines 29-34) the present invention realizes an efficient test within a short time by performing a test cell loopback check, which has been made in a test device, through a test program in the switch. Additionally, transmitting cell data from a test device requires no testing units because the loopback jig can replace the testing units. Further motivation (as suggested by Numminen, column 11 lines 5-8) is that the invention can also be modified in many ways without departing from the scope of the invention defined by the claims.

In regards to claim 44, Numminen teaches a memory (column 7 line 27, memory media) communicatively coupled to a digital signal processing device (DSPD) (column 7 line 26, a microprocessor).

In regards to claim 64 Numminen teaches a receive data processor (figure 3 element 304), a transmit data processor (figure 3 element 310) and a controller (figure 3 element 307).

Allowable Subject Matter

10. Claims 14, 21, 47, 48, 49 and 53 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Response to Arguments

11. Applicant's arguments, see pages 20 and 21 of the Remarks section, filed 3/20/2006, with respect to the rejections of claims 1, 5, 6, 28-32, 39, 40, 44, 45, 56, 57, 59, 61, 63, 64, 66-68 have been fully considered and they are not persuasive. The applicant argues with the addition of limitation "the wireless data communication system is a code division multiple access (CDMA) system supporting cdma200 high rate packet data air interface (HAI) standard" puts the claims in condition for allowance. However, Examiner respectfully disagrees with this assertion for the reason cited in this office action. The Examiner also withdraws prior objections to claims 9 and 24 and rejects them for reasons cited in this office action.

12. Applicant argues, claim 5 to be allowable due to the amended limitation "transmit a plurality of loop back packets via a reverse traffic channel wherein one loop back

packet is formed for each particular time interval". However, the examiner respectfully disagrees with the assertion for the reasons cited in this office action.

13. Applicant argues, claim 28 to be allowable due to the amended limitation "the first data transmission comprises a plurality of packets and wherein each packet on the second data transmission includes a parameter value indicative of omission of one or more packets received on the first data transmission". However, the examiner respectfully disagrees with the assertion for the reasons cited in this office action.

14. Applicant argues, claims 44 and 56 to be allowable due to the amended limitation "the memory communicatively coupled to the digital signal processing device (DSPD) is in a code division multiple access (CDMA) system supporting cdma200 high rate packet data air interface (HAI) standard". However, the examiner respectfully disagrees with the assertion for the reasons cited in this office action.

15. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Salman Ahmed whose telephone number is (571)272-8307. The examiner can normally be reached on 8:30 am - 5:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Hassan Kizou can be reached on (571) 272-3088. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Art Unit 2616

SA
04/10/2006

HASSAN KIZOU
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2600